

**REMARKS**

Claims 1-16 are pending in the application. Claims 1-16 stand rejected. Claims 1-14 and 16 have been amended. No new matter has been added.

The examiner has objected to the specification because of errors in grammatical construction.

Applicant, through his attorney, wishes to thank the examiner for his observation regarding the errors in grammatical construction and have corrected each of the errors noted on pages 2, 5 and 9. With regard to the errors alleged on page 1, applicant has carefully reviewed the language and believes that the language is correct. In this case, the use of the definite article "the" is correct with regard to "the at least one pixel" and refers back to the indefinite article used to first introduce "at least one pixel." Similar language is shown in the claims. Accordingly, no correction is made in this context.

Having made the corrections indicated, applicant submits that the reason for the examiner's objection has been overcome. Applicant respectfully requests entry of the amended specification language and withdrawal of the objection.

The examiner has objected to claim 2 for failing to particular point out the subject matter which the applicant regards as his invention. More specifically, the examiner objects to the wording "static filter the at least."

Applicant, through his attorney, wishes to thank the examiner for his observation regarding the errors in grammatical construction and have amended the claim 2 to more clearly state the invention.

Having made the correction to claim 2, applicant submits that the reason for the examiner's objection has been overcome. Applicant respectfully requests entry of the amended claim language and withdrawal of the objection.

The examiner has objected to the drawings for not having suitable descriptive legends, which are required by the examiner where necessary for understanding the drawings.

Applicant respectfully disagrees that the lack of descriptive legend renders the invention difficult to understand. However, in the interest of advancing the prosecution of this application, applicant has attached hereto a copy of the original and amended figures 1, 3, 4 and, 6 that include descriptive legends.

Having made the provided amended drawings, applicant submits that the reason for the examiner's objection has been overcome. Applicant respectfully requests entry of the amended drawings and withdrawal of the objection.

Furthermore, applicant elects to provide informal drawings at this time and reserves the right to provide formal drawings upon an indication of allowable subject matter.

Claims 1-3, 5, 7 -13 and 15 stand rejected under 35 U.S.C. §102(b) as being anticipated by USP No. 5,467,380A to De Jonge. It is the examiner's position that De Jonge discloses each and every element of the present invention as recited in the above referred to claims.

Applicant respectfully disagrees with, and explicitly traverses, the examiner's reason for rejecting the claim. It is well recognized that to constitute a rejection pursuant to 35 USC §102, i.e., anticipation, all material elements recited in a claim must be found in one unit of prior art.

With regard to independent claim 1, this claim describes a method of noise filtering an image sequence by determining statistics in at least one image ... and calculating at least one filtered pixel value from a set of original pixel values ... wherein the original pixel values are weighted under control of the statistics." (emphasis added).

De Jonge, on the other hand, discloses a system for noise filtering by time averaging values among a plurality of images. More specifically, De Jonge teaches that "[a] weighted average of pixel values-for a time-sequence of successive images is ...computed from the time-sequence of images I<sub>1-5</sub>." (col. 4 lines 61-63). De Jonge then

shows, with regard to Fig.1, how a weighted time-average of the information in a selected one (the third image) of five images obtained, by applying the weights to each of the five images, wherein the weight applied to the selected image is fixed at 100%. The result is thus a filtered image as 100 percent of the selected image ( $I_3$ ) with different weights for the two prior ( $I=4,5$ ) and two subsequent ( $I=1,2$ ) images.

De Jonge fails to disclose "determining statistics in at least one image" or "weights under the control of the statistics" as is recited in claim 1. Accordingly, De Jonge can not be said to anticipate the present invention as De Jonge does not disclose each and every element recited. Hence, applicant submits that claim 1 is patently distinguishable from the teachings of De Jonge device and, thus, respectfully requests withdrawal of the rejection, and allowance of the claim.

With regard to independent claim 15, the examiner rejected this claim reciting the same reason used to reject claim 1. However, claim 15 discloses the same elements as those recited in claim 1. Accordingly, for the same remarks made with regard to claim 1, claim 15 can also be shown to include subject matter not disclosed by De Jonge and, thus, is patently distinguishable from the De Jonge teachings.

Applicant submits that the reason for the examiner's rejection have been overcome and can no longer be sustained. Applicant respectfully requests withdrawal of the rejection, and allowance of claim 15.

With regard to claims 2-3, 5, and 7 -13, these claims ultimately depend from independent claim 1, which has been shown to be allowable over the cited reference. Accordingly, claims 2-3, 5, and 7 -13 are also allowable by virtue of their dependence from an allowable base claim.

Claims 4, 6, 14 and 16 stand rejected pursuant to 35 USC §103(a) as being unpatentable over De Jonge in view of USP No. 5,055,927 to Kessen. It is the examiner's position that with regard to claim 4, "De Jonge teaches a spread using differences to obtain a weighed average ... for a time-sequence of successive images.

(emphasis added). Keesen teaches temporal spread that is the sum of absolute differences (Fig. 8) ... a given absolute difference being obtained by subtracting a pixel value (fig. 8, label TV) from a given original pixel value (fig. 8, label HD). It would have been obvious ... to modify the teachings of De Jonge of obtaining an average pixel value using differences with the teachings of Keesen's spatio-temporal filter of figure 8." The reasons for rejecting claims 6, 14 and 6 are similar.

Applicant respectfully disagrees with, and explicitly traverses the examiner's reasons for rejecting the claims. A claimed invention is prima facie obvious when three basic criteria are met. First, there must be some suggestion or motivation, either in the reference themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine the teachings therein. Second, there must be a reasonable expectation of success. And, third, the prior art reference or combined references must teach or suggest **all** the claim limitations.

Keesen discloses a dual channel system wherein one channel transmits low resolution TV images and the other high resolution images associated HDTV. The filter disclosed in fig. 8 illustrates a device for determining a difference between pixels that are contained in images of the two channels.

While claim 4 recites using absolute differences to determine the statistics, the differences are determined among pixels within an image. Keesen fails to disclose that the differences are determined among pixels within an image.

There is no motivation to combine the teachings of Keesen and De Jonge, as suggested by the examiner, because neither Keesen nor De Jonge teaches or suggests "determining statistics in an image" or applying "weights under the control of the statistics," as is claimed.

In fact, Kessen cannot merely be incorporated into De Jonge because De Jonge teaches a single channel transmission and Kessen requires determining the difference between the images on two different channels. Hence, there would be no means to modify the De Jonge teaching to incorporate the two channel filter of Keesen.

Accordingly, the combination of De Jonge and Keesen can not render the present invention obvious because there is no suggestion or teaching to combine the

devices and even if it were possible to combine the two devices the combined device would not include all the elements claimed.

With regard to claims 5, 14 and 16, these claims were rejected for reasons similar to that used to reject claim 4. Accordingly, the remarks made with regard to claim 4 are appropriate and, hence, repeated in overcoming the rejection of claims 5, 14 and 16.

Having shown that the device suggested by the examiner does not include all the elements of the instant invention claimed, applicant submits that the reasons for the examiner's rejections of the claims have been overcome and can no longer be sustained. Applicant respectfully requests withdrawal of the rejection and allowance of the claims.


Having addressed the examiner's objections and rejections under 35 USC § § 102, and 103 applicant submits that for the amendments and remarks made herein the reasons for the examiner's rejections have been overcome and can no longer be sustained. Applicant respectfully requests reconsideration and withdrawal of the rejections and that a Notice of Allowance be issued.

Should any unresolved issues remain that the examiner believes may be resolved via a telephone call, the examiner is invited to call Applicant's attorney at the telephone number below.

Respectfully submitted,

Russell Gross  
Registration No. 40,007

Date: 6/17/04

  
By: Steve Cha  
Attorney for Applicant  
Registration No. 44,069


**Mail all correspondence to:**

Russell Gross, Esq.  
US PHILIPS CORPORATION  
P.O. Box 3001  
Briarcliff Manor, NY 10510-8001  
Phone: (914) 333-9631  
Fax: (914) 332-0615

**Certificate of Mailing Under 37 CFR 1.8**

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in an envelope addressed to MAIL STOP AMENDMENTS, COMMISSIONER FOR PATENTS, P.O. BOX 1450, ALEXANDRIA, VA. 22313 on June 17, 2004

Steve Cha, Reg. No. 44,069  
(Name of Registered Rep.)

  
(Signature and Date)